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EMOTIONAL MANAGEMENT AND SELF-EFFICACY ASSOCIATED WITH LOW STRESS LEVELS IN SPANISH UNIVERSITY TEACHERS: A NATIONAL PERSPECTIVE

La gestión emocional y la autoeficacia se asocian con bajos niveles de estrés en el profesorado universitario español: una perspectiva nacional

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INTRODUCTION. Stress is defined as a state of physical and mental exhaustion, derived from a demanding context. Several national reports indicate that six out of ten teachers present medium to high levels of stress, affecting the quality of their professional activity. This perspective is extremely common in Higher Education. The aim of this research was to better understand the relationships between emotional management, stress and self-efficacy, alongside the effect of other academic and professional variables in Higher Education teachers. **METHOD.** The present study was descriptive, ex post-facto and cross-sectional and was performed with a sample of 798 Higher Education teachers from 15 Spanish universities, using IBM SPSS v.23.0 software for data analysis. **RESULTS.** Better emotional regulation was observed in males, those with a stable job and those working in the field of Science. Stress was higher amongst non-academic staff, whilst teaching staff perceived themselves to have greater self-efficacy when they reported family responsibilities and other obligations. Along these lines, teaching experience was determined to favour cognitive re-evaluation and self-efficacy, whilst also decreasing stress levels. This was especially the case amongst permanent teaching staff. Further, emotional regulation favoured a decrease in stress and the development of self-efficacy. **DISCUSSION.** In conclusion, the need is established to conduct actions for the development of emotional regulation techniques within university teaching staff. This will allow one self to manage stressful situations and inoculate anxiety and stress derived from professional activity. Ultimately, it will result in an improvement in teaching activity, favouring the achievement of the proposed teaching objectives and the academic performance of students.

Keywords: *Higher Education, Stress management, Emotional adjustment, Self-efficacy.*

Introduction

Teaching is one of the most extensively examined profession in studies addressing working conditions, performance and wellbeing (Milatz *et al.*, 2015; Oberleb and Schonert-Reichl, 2016; Renshaw *et al.*, 2015). Over recent years, important changes have been generated in the working ambit. Amongst those that most stand out are new social dynamics, emerging types of employment, evolving training needs and the predominant expansion of technology (Yale, 2019). In this way, over recent decades the majority of professions will have noted a strong need to update their approaches. Particular interest has been placed on the particularities occurring in the world of teaching, in both a general way and, more specifically, at the university level (Hanaysha, 2016; Toropova *et al.*, 2020).

In the same way as has been seen in the European ambit, university teaching staff in the Spanish context report high academic-training and work demands (Meyer, 2012). This panorama often requires multi-disciplinary training, in addition to adding to quality demands relating to their teaching practice and research outputs in high impact mediums (Han and Yin, 2016).

The vocation of teaching and providing a quality social service must also be considered in addition to this situation, alongside the need to promote a furthering of the profession itself with the aim of accessing better economic and working conditions (Milatz *et al.*, 2015). Given this perspective, various research works have considered teaching performance linked to health and wellbeing, proposing the need to develop actions which enable improvements to quality of life within this group (Martínez-Clares and González-Lorente, 2019; Milatz *et al.*, 2015).

Stress represents a state of tension and emotional imbalance which is produced when an individual perceives themselves to be incapable of overcoming a situation or demand (Burman

and Goswami, 2018). According to data reported by the World Health Organisation (WHO) (2020), two out of every five workers suffer from job stress. Studies in the Spanish national context have reported even higher values of close to 40% in university teaching staff (Schwarzer and Hallum, 2008).

These figures lead special attention to be given to this psychosocial situation, its causes and its consequences. Amongst these aspects, greater absenteeism, deteriorated performance and a damaged institutional image can also be indicated at the job level (WHO, 2020). Further, hypertension, fatigue, irritability and digestive problems have been indicated at a physiological level (Goyal *et al.*, 2014). For all of the above, it is crucial to develop actions which enable the prevention and treatment of stress, with the main objective being improved wellbeing of teaching staff and, consequently, better performance of their teaching activity.

Given this perspective, important studies such as those conducted by Malesza (2019) and Waugh (2020) emphasise the importance of developing the capacity for understanding and emotional regulation for tackling negative events and treating stress. Emotion is understood as an organic response experienced by individuals when presented with an external stimulus. Thus, it can occur when faced with positive or negative situations and is related to different levels of intensity or *arousal* (Gross, 2013).

These premises are applicable to the working context, specifically, to stressful situations due to job instability or competence incapacity. These situations are seen in the professional university context (Millán *et al.*, 2017). In this way, it appears evident that those teachers who possess a greater capacity of regulating their emotions -a capacity measured according to cognitive re-evaluation and expressive suppression- should also better manage their stress. This will make them more open to experiencing

greater wellbeing and self-efficacy at work (Kamil, 2014; Tacca and Tacca, 2019).

In line with that presented, self-efficacy provides the final construct to be approached here. This is defined by Bandura (2010) as the capacity of an individual to manage, carry out and organise the resources they have at their disposition in order to tackle the situations they are faced with. This skill also implies certain beliefs about their ability to achieve success. Schwarzer and Hallum (2008) and Mohsen (2017) have demonstrated that stress acts as a mediator of self-efficacy and *burnout*, in the working and academic context. In this way, a decrease in self-efficacy generates an increase in exhaustion and cynicism, leading to stress.

In response to this situation, Pocnet *et al.* (2017) concluded that a greater capacity for emotional regulation exercises a positive effect on neuroticism and self-efficacy, improving quality of life at a physical and cognitive level in diverse contexts. For this, an interesting research niche emerges, seeking to examine the value of emotional regulation within the teaching ambit in higher education. This stage is important as it is marked by certain highly specific characteristics which generate stressful situations on a regular basis. The prevention and treatment of this is, therefore, indispensable (Mérida-López and Extremera, 2017; Zysberg *et al.*, 2017).

Based on all of the information presented above, the present study sought to answer the research question of whether emotional regulation and self-efficacy act as mediators of perceived stress in university staff, stratifying according to working conditions. This established as a main objective the analysis of the potential associations between these variables. In this way, the following hypotheses were proposed: a) higher levels of stress will be associated with a lower capacity of emotional regulation and self-efficacy; and b) teaching staff with greater job instability, management duties and family responsibilities will also report elevated stress and lower self-efficacy.

Method

Design and participants

The present study presents research which employed a non-experimental, ex post-facto, descriptive and cross-sectional design. The population of interest was Spanish university staff. Staff from different Spanish universities were invited to participate, thus, sampling was random and did not use convenience sampling. Measurements were made once within a single group. The sample was comprised of a total of 798 higher education teachers from 15 Spanish universities. Respondents were represented by the four knowledge areas: Health Sciences (23.4%), Social and Legal Sciences (22.7%), Technology and Engineering Sciences (26.7%) and Humanities (27.2%). The sample was distributed according to 54.5% males and 45.5% females. Self-reported ages belonged to four groups which were distributed from 30 years old to 55 years and above. In this case, the largest proportion pertained to the age range of 41-55 years (39.8%), followed by older than 55 (29.8%), between 30 and 40 (23.4%) and, finally, younger than 30 (6.9%). In relation to the professional setting, 53.4% were teaching staff, whilst 46.6% were non-teaching staff. Participants had different levels of teaching experience, as follows: Less than 5 years (19%), between 5 and 10 years (15.2%), between 11 and 20 years (24%), between 21 and 30 years (19.5%) and more than 30 years (22.3%).

Instruments

In order to measure the proposed variables, the following instruments were employed:

- Emotional regulation questionnaire, ERQ (Gross and John, 2003). This is a self-report questionnaire that evaluates two factors: Cognitive re-evaluation (6 items) and expressive suppression (4 items). It comprises 10 items which are rated along

a 7-point Likert scale, with 1 being totally disagree and 7 being totally agree. The validated Spanish version of this instrument (Cabello *et al.*, 2013) presents acceptable internal consistency, with an alpha coefficient of .75 for expressive suppression and an alpha coefficient of .79 for cognitive re-evaluation.

- Perceived Stress Scale, PSS-14 (Cohen *et al.*, 1983). This scale is a self-report instrument that evaluates perceptions of stress over the month prior to instrument completion and is based on the model of stress described by Lazarus and Folkman. It comprises 14 items which evaluate the extent to which respondents perceived their life as being unpredictable, uncontrollable and overbearing throughout the previous month. It employs a 5-point response scale (1 = never; 5 = very often). An overall score is obtained by inverting scores for items 4, 5, 6, 7, 9, 10 and 13 and, following this, adding all of the scores together. Higher scores indicate perceptions of higher levels of stress. The Spanish version of the instrument has demonstrated adequate reliability (internal consistency, $\alpha = .81$, and test-retest, $r = .73$), validity (concurrent) and sensitivity (Remor, 2006).
- General Self-Efficacy Scale (Baessler and Schwarzer, 1996). This self-report questionnaire enables evaluations of feelings of personal competence for effectively overcoming a variety of situations. It comprises 10 items rated along a 4-point Likert scale (1 = unsure; 4 = sure). For the Spanish version of the instrument, internal consistency of .87 has been obtained (alpha coefficient) and a split half correlation of .88 (Sanjuán *et al.*, 2000).

Procedure

Firstly, an online version of the questionnaire was constructed using the tool Google Forms. This modality enabled access to a broader and

more geographically disperse population, with lower costs to time and resources. Next, this was sent out via mass mail-out to teaching staff at various Spanish universities, reaching them through institutional email. The email included an invitation to participate with a link to the questionnaire, alongside a participation information letter containing the objectives and confidentiality criteria. The full process complied with the ethical research principles defined in the Declaration of Helsinki in 1975 and later re-established in Brazil in 2013.

Data analysis

Data analysis was performed using the software IBM SPSS® for Windows in its version 23.0. Frequencies and means were employed for basic descriptive analysis. Likewise, Cronbach alpha coefficient analysis was employed to determine internal consistency of instruments, setting the reliability index at 95%. The parametric nature of the data permitted the use of Student's t-test for independent samples and one-way ANOVA in order to examine relationships between dependent and independent variables.

Results

Emotional regulation (ER)

No relationship was found between cognitive re-evaluation (RC) and the independent variables established in the research as show Table 1 and Table 2. In relation to the dimension of expressive suppression (SE), statistically significant differences were identified for the variables of sex, professional category, field of knowledge (Table 1) and teaching experience (Table 2).

In this sense, when specifically considering sex, male teachers were seen to score more highly on this dimension. With regards to professional

category, official permanent teaching staff reported higher scores relative to casual or non-permanent staff. Moreover, it was observed that teaching staff in the field of science obtained higher average scores for expressive suppression when compared with those in the field of humanities.

Finally, in relation to teaching experience, it was uncovered that university staff with greater experience (more than 30 years) also showed a greater degree of expressive suppression, followed by those who reported the least experience (less than 5 years). The three middle intervals relating to length of experience presented lower scores for expressive suppression.

Perceived stress (PE)

A link was also found between perceived stress (EP) and a number of the independent variables included in the present research: Family responsibility, professional category, any other job position, age and teaching experience. In relation to family responsibility, it was revealed that teachers who report having fewer duties in the family setting are those who have greater perceptions of stress, with perceptions being lower amongst those with a high or a very high level of family responsibility.

For professional category, it is observed in Table 1 that casual or non-permanent staff scored more highly for perceived stress when compared with official permanent teaching staff. With respect to job position, perceptions of stress were reduced amongst university staff

who combined teaching work with another profession.

Furthermore, it is observed in Table 2 that perceived stress level is greater amongst younger participants, with the highest values being found amongst teachers younger than 30 years old. Specifically, it is seen that as the age-range being examined increases, the perception of stress decreases.

Finally, in relation to teaching experience, it is uncovered that whilst those who had spent the least time teaching were most vulnerable to high stress levels, beyond this perceived stress level reduced as the number of years of teaching experience increased. Concretely, highest scores were found amongst university teaching staff who had spent less than 5 exercising in the teaching profession.

General self-efficacy (GSE)

Further, as can be observed in Tables 1 and 2, an association was found between general self-efficacy (AG) and two of the independent variables, namely, family responsibility and having another job position. In this sense, university teachers who reported high or very high levels of family responsibility have greater self-perceptions of general self-efficacy when compared to those who have few or no responsibilities in this setting. In the same way, university staff who combine their teaching work at the university with another job position scored more highly for self-efficacy than those who reported their university work as their only employment.

TABLE 1. Relationship between the dimensions of RC, SE, AG and EP, and the socio-demographic variables

			M	SD	Standard Error	F-test	Sig. (Lev.)	Sig. (Tow-tailed)
ER	Sex	Man	4.74	1.07	0.052	0.248	.619	.122
		Woman	4.86	1.09	0.058			
	Level of family responsibility	High/Very high	4.77	1.10	0.048	1.200	.274	.238
		Low/None	4.86	1.04	0.066			
	Professional category	With CSS	4.73	1.08	0.053	0.125	.724	.056
		Without CSS	4.88	1.07	0.056			
	Managerial duties	Yes	4.74	1.00	0.073	1.071	.301	.458
		Not	4.81	1.10	0.045			
	Any other job position	Yes	4.95	1.15	0.097	1.012	.315	.056
		Not	4.76	1.06	0.042			
	Field of knowledge	Sciences	4.76	1.08	0.054	0.001	.971	.363
		Social Sciences	4.83	1.09	0.055			
ES	Sex	Man	3.74	1.42	0.069	10.671	.001*	.000*
		Woman	3.08	1.22	0.064			
	Level of family responsibility	High/Very high	3.41	1.31	0.057	8.747	.003*	.395
		Low/None	3.50	1.49	0.094			
	Professional category	With CSS	3.55	1.36	0.066	0.096	.756	.011*
		Without CSS	3.31	1.37	0.072			
	Managerial duties	Yes	3.36	1.28	0.093	2.291	.131	.343
		Not	3.47	1.40	0.057			
	Any other job position	Yes	3.27	1.32	0.110	0.804	.370	.100
		Not	3.48	1.38	0.054			
	Field of knowledge	Sciences	3.56	1.34	0.067	0.326	.568	.012*
		Social Sciences	3.32	1.40	0.070			
PS	Sex	Man	2.65	0.68	0.033	0.967	.326	.154
		Woman	2.72	0.71	0.038			
	Level of family responsibility	High/Very high	2.63	0.66	0.029	7.285	.007*	.006*
		Low/None	2.78	0.76	0.049			
	Professional category	With CSS	2.57	0.64	0.032	6.402	.012*	.000*
		Without CSS	2.80	0.73	0.039			
	Managerial duties	Yes	2.65	0.70	0.052	0.001	.976	.577
		Not	2.69	0.69	0.029			
	Any other job position	Yes	2.52	0.66	0.056	0.304	.581	.002*
		Not	2.71	0.69	0.028			
	Field of knowledge	Sciences	2.65	0.68	0.035	0.260	.610	.260
		Social Sciences	2.71	0.70	0.036			

			M	SD	Standard Error	F-test	Sig. (Lev.)	Sig. (Tow-tailed)
GS	Sex	Man	3.20	0.49	0.024	6.077	.014*	.107
		Woman	3.14	0.54	0.029			
	Level of family responsibility	High/Very high	3.20	0.49	0.021	0.814	.367	.017*
		Low/None	3.11	0.54	0.034			
	Professional category	With CSS	3.17	0.51	0.025	0.100	.752	.737
		Without CSS	3.16	0.52	0.027			
	Managerial duties	Yes	3.19	0.51	0.037	0.147	.701	.536
		Not	3.16	0.51	0.021			
	Any other job position	Yes	3.26	0.51	0.043	0.085	.770	.021*
		Not	3.15	0.51	0.020			
	Field of knowledge	Sciences	3.17	0.49	0.024	3.152	.076	.950
		Social Sciences	3.17	0.53	0.027			

1. M, Mean; SD, Standard Deviation; F, F-Test; T, T-Test.

2. ER, Emotional Regulation; CR, Cognitive Re-evaluation; ES, Expressive Suppression; PS, Perceived Stress; GS, General Self-Efficacy; CSS, Civil Service Status.

3. *p < .05.

TABLE 2. Relationship between the dimensions of RC, SE, AG and EP, and the variables of age and teaching experience

		M	SD	Confidence Interval (95%)		F	Sig.
				Lower limit	Upper limit		
RC	Age	Less than 30	4.84	0.79	4.63	1.487	.217
		30-40 years	4.83	1.08	4.68		
		41-55 years	4.86	1.12	4.73		
		More than 55	4.67	1.09	4.53		
	TE	Less than 5	4.79	0.94	4.64	2.342	.053
		5-10 years	4.96	1.14	4.75		
		11-20 years	4.83	1.03	4.68		
		21-30 years	4.85	1.19	4.66		
	ER	+ 30 years	4.59	1.09	4.43	1.784	.149
		Less than 30	3.72	1.50	3.32		
SE	Age	30-40 years	3.35	1.39	3.14	2.477	.043*
		41-55 years	3.37	1.37	3.22		
		More than 55	3.54	1.33	3.37		
	TE	Less than 5	3.49	1.41	3.26		
		5-10 years	3.34	1.38	3.09		
		11-20 years	3.32	1.34	3.12		
		21-30 years	3.34	1.41	3.12		
	ER	+ 30 years	3.71	1.30	3.52		
		Less than 30	3.72	1.50	3.32		
	Age	30-40 years	3.35	1.39	3.14		
		41-55 years	3.37	1.37	3.22		

		M	SD	Confidence Interval (95%)		F	Sig.	
				Lower limit	Upper limit			
PS	Age	Less than 30	2.93	0.81	2.70	3.16	17.982	.000*
		30-40 years	2.92	0.69	2.82	3.02		
		41-55 years	2.64	0.64	2.57	2.71		
		More than 55	2.47	0.66	2.38	2.56		
	TE	Less than 5	2.91	0.72	2.79	3.03	11.001	.000*
		5-10 years	2.81	0.73	2.68	2.94		
		11-20 years	2.71	0.64	2.62	2.81		
		21-30 years	2.54	0.65	2.43	2.64		
		+ 30 years	2.47	0.65	2.37	2.57		
	GS	Age	Less than 30	3.15	0.60	2.99	3.31	0.122
30-40 years			3.18	0.49	3.11	3.25		
41-55 years			3.17	0.50	3.12	3.23		
More than 55			3.16	0.52	3.09	3.22		
TE		Less than 5	3.13	0.55	3.04	3.22	0.393	.814
		5-10 years	3.19	0.47	3.10	3.27		
		11-20 years	3.15	0.47	3.09	3.22		
		21-30 years	3.19	0.51	3.11	3.27		
		+ 30 years	3.18	0.54	3.10	3.26		

1. M, Mean; SD, Standard Deviation; F, F-Test.

2. ER, Emotional Regulation; CR, Cognitive Re-evaluation; ES, Expressive Suppression; PS, Perceived Stress; GS, General Self-Efficacy; TE, Teaching Experience

3. * $p < .05$.

Overall relationship between variables

Table 3 presents bivariate Pearson correlations between the studied variables, considering the age of individuals, teaching experience and professional category (official permanent staff at the top and casual or non-permanent staff at the bottom). Important results are observed for the association between age and expressive suppression, showing a negative relationship in relation to casual or non-permanent staff and a non-significant relationship in official permanent staff. Likewise, age was negatively correlated with perceived stress in both groups, displaying a slightly weaker correlation strength in relation to permanent staff.

The relationship between cognitive re-evaluation and teaching experience also turned out to be important, although this association was only significant for permanent staff. Likewise, the association between teaching experience and perceived stress was statistically significant in both groups, being weaker in official permanent staff. General self-efficacy was only positively related with cognitive re-evaluation in permanent staff.

Finally, the relationship between perceived stress and emotional regulation was addressed. Statistically significant associations were only observed in relation to non-permanent staff, with stress being negatively associated with cognitive re-evaluation ($r = -.237$; $p = .01$) and

TABLE 3. Bivariate Pearson correlations according to professional category

	With CSS					
	Age	TE	CR	ES	GS	PE
Without CSS	Age	1	.744**	-.088	.028	-.172**
	TE	.657**	1	-.117*	.059	-.144**
	CR	.041	.064	1	-.004	.151**
	ES	-.116*	-.102	-.027	1	-.096
	GS	-.020	.057	.267**	-.116*	1
	PE	-.198**	-.180**	-.237**	.206**	-.548**

1. ER, Emotional Regulation; CR, Cognitive Re-evaluation; ES, Expressive Suppression; PS, Perceived Stress; GS, General Self-Efficacy; TE, Teaching Experience; CSS, Civil Service Status.

2. * $p < .05$; ** $p < .01$.

positively associated with expressive suppression ($r = .206$; $p = .01$). Likewise, stress was inversely associated with general self-efficacy, producing a stronger correlation in relation to non-permanent staff.

Discussion and conclusions

When we talk about emotional regulation we are referring to the process through which individuals identify, modify and express their emotions whilst interacting with other. Emotional regulation is determined by two highly differentiated variables. The first of these is cognitive re-evaluation. This consists of making some sort of mental transformation of a situation that challenges us, in this way reducing its emotional impact. The second is expressive suppression. This refers to not showing any type of emotional response, neither positive nor negative (Cabello *et al.*, 2013).

The present research establishes that the capacity for cognitive re-evaluation of university teaching staff can be explained by five of the points on a 7-point scale, without finding any relationship with any of the sociodemographic variables. Further, average scores for expressive suppression were lower. This indicates a

moderate tendency towards the suppression of positive or negative emotions. This variable, however, was seen to be determined by factors such as sex, professional category, field of knowledge and teaching experience.

Males were found to repress their emotional expressions much more than females. These results are in accordance with those reported in a study by García (2017). This study indicated that the origin of this suppression may be linked to social expectations and the roles that have been traditionally attributed to males. As a result of this, males may feel a degree of stress if they openly demonstrate their emotions. Other research studies argue that these results could be related with gender differences, arguing that females present better emotional management skills than males, or that males employ expressive suppression to a greater extent (Illaja and Reyes, 2016; Moreta, *et al.*, 2018; Nolen-Hoeksema and Aldao, 2019).

With regards to professional category, official permanent teaching staff (contracted lecturers and university professors) present higher scores for expressive suppression when compared to casual or non-permanent staff (substitutes, short-term contracted researchers, junior researchers, research assistants, amongst others).

In addition, in relation to the field of knowledge, teachers specialising in the sciences (science, technology and engineering, and health sciences) repress the expression of their emotions to a greater extent than teachers specialising in the arts (humanities and social sciences, and legal sciences).

Teaching experience is another variable that impacts upon the suppression of emotions within this group of university teachers. Concretely, teaching staff who fall within the extreme ranges of teaching experience repress the expression of their emotions to a greater extent than the rest. The present results go along the same lines as those reported in other research studies (Johnson *et al.*, 2017), which have also demonstrated that the younger an individual and the shorter their teaching experience, the worse their capacity for employing different strategies for emotional regulation. The present study uncovers that younger individuals with less experience have greater difficulty facing up to new experiences. This is due to the fact that they have not experienced similar situations previously. They are, therefore, considered to be less wise and possess less effective emotional management skills.

Nonetheless, in the present research study teachers with the least or the most experience presented higher scores for expressive suppression and, consequently, worse emotional regulation. These scores could be the result of mental exhaustion from this profession in the first and final years of a teacher's professional trajectory. This is supported by García (2017) who emphasises that teaching is an incredibly demanding and draining job.

In any case, average scores obtained by this group of university teachers for cognitive re-evaluation and expressive suppression reflect a good capacity for managing emotions. Authors such as Lee *et al.* (2016) highlight the importance of using cognitive re-evaluation given that it is linked to the production of positive

emotional experiences. On the other hand, expressive suppression generally produces negative results, leading to the conclusion that the data obtained establish that teachers develop appropriate emotional regulation skills.

Similar results have also been obtained in other research studies which confirmed that the majority of university teachers present acceptable levels of emotional regulation (Maldonado *et al.*, 2017). Such studies have also detected frequent use by teaching staff of the cognitive re-evaluation dimension as a means of appropriately managing their emotions (Yin *et al.*, 2018).

In relation to perceived stress, data collected through the present research study reflect moderate stress levels in university teaching staff. This coincides with findings uncovered in other previously conducted studies (Domínguez, 2004) and may be explained by the good capacity seen within this group to regulate emotions. It is particularly notable that statistically significant relationships were observed between perceived stress and emotional regulation and, specifically, that such relationships most strongly emerged within non-permanent staff. Indeed, within this group cognitive re-evaluation was a negative determinant of this relationship, whilst expressive suppression was a positive determinant. García (2017) reports evidence of the relationship between the two variables, indicating that teachers who increase their capacity for emotional regulation, decrease or eliminate their stress.

Further, it was found that the perception of stress is determined by professional category, age, teaching experience, family responsibility and holding another job position. Concretely, the present results establish that non-permanent staff perceive themselves to suffer higher stress levels than permanent staff. Previously conducted research studies (Domínguez, 2004) have uncovered similar findings. These studies have confirmed that stress indices are greater amongst non-permanent staff. Explanations offered for

these outcomes relate to the reduced financial compensation and social standing given to these individuals in contrast to permanently contracted staff. To this, job intensity and excessive work demands for progressing in this professional career should also be added (Han and Yin, 2016; Milatz *et al.*, 2015).

Further, perceived stress was also found to be greater in younger teachers with less experience, with stress decreasing as both parameters increased. Such results are similar to those shown by Yin *et al.* (2020) who expressed that younger teaching staff tend to suffer greater stress. Outcomes also coincide with those outlined by Díaz (2011) and Rodríguez and Rivas (2011). These authors state that teaching experience enables teachers to get to know their profession better. As a result, the demands of the job will not be greater than their abilities, minimising the stress that is produced by the feeling that one's job performance does not meet their job demands.

In relation to family responsibility and having another job position, the present research demonstrates, in contrast to evidence presented by other studies (Díaz, 2011; Rodríguez and Rivas, 2011), that teachers with more family responsibilities and those combining their university profession with another job, present lower perceptions of stress. This could be explained by the fact that an inverse relationship exists between self-efficacy and the perception of stress. This makes sense when it is considered that both of these groups scored more highly for general self-efficacy.

Finally, self-efficacy refers to the capacity to approach and overcome challenging situations by managing the resources and tools required. Further, this involves beliefs about one's capacity for success (Bandura, 2010). Results of the present research show that this group of university teachers have a high level of self-efficacy, typically exceeding 3 points on a scale where 1 to 4 points were possible.

Further, a relationship was found between self-efficacy and variables describing family responsibility and possession of another job. Specifically, teachers with a greater load with regards to family responsibility and those with another job scored more highly for self-efficacy. Based on the relationships detected between the psychosocial variables, an inverse relationship could be observed between cognitive re-evaluation and teaching experience. This relationship was significant for permanent staff, denoting that the capacity for emotional regulation decreases with the passing of time. Likewise, a positive relationship was specified in this group between this same dimension and self-efficacy. As an explanation of these results, it could be argued that permanent staff enjoy better economic and working conditions, especially those linked to job stability (Kamil, 2014; Tacca and Tacca, 2019). All of that mentioned above will generate better self-perceptions in relation to the ability to confidently and competently perform job activities, making individuals more self-efficient and calling less on their resources of emotional regulation for dealing with adversity (Yin *et al.*, 2020).

Along the same lines, stress is negatively associated with cognitive re-evaluation and positively associated with expressive suppression, with this relationship only emerging amongst non-permanent staff. Further, stress was inversely associated with general self-efficacy, especially within this professional category. These findings urge the need for greater emotional regulation skills amongst teaching staff who operate within worse working conditions (greater teaching load for less financial compensation). This is important as this group is characterised by higher levels of stress than those typically experienced by teachers (Wiegel *et al.*, 2016). Likewise, there is a clear need to develop actions which improve teachers' self-efficacy and cognitive re-evaluation as these act as mediators of stress and could improve wellbeing in this group (Chacón-Cuberos, 2020; Yin *et al.*, 2020).

Finally, it is important to indicate the main limitations presented by the present research work. In the first instance, the methodological design could be indicated as the study was descriptive and cross-sectional in nature, thus impeding causal conclusions from being made. Despite this, it is crucial to highlight that this type of study is effective for better understanding the state of the issue. The selected sample could also be outlined as another limitation. Specifically, future perspectives are established which include the need to conduct stratified randomised sampling, considering field of knowledge and professional position. Finally, the timing of data collection may have constituted an

intrinsic limitation in itself as data collection was interrupted by the pandemic generated by the spread of the COVID-19 virus. This caused changes in the teaching approaches taken by university staff, potentially modifying some of the variables analysed such as the perception of stress.

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References

- Baessler, J. and Schwarzer, R. (1996). Evaluación de la autoeficacia: adaptación española de la Escala de Autoeficacia General. *Ansiedad y Estrés*, 2, 1-8.
- Bandura, A. (2010). Self-efficacy. *The Corsini Encyclopedia of Psychology*, 2010, 1-3. <http://doi.org/10.1002/9780470479216.corpsy0836>
- Burman, R. and Goswami, T. G. (2018). A systematic literature review of work stress. *International Journal of Management Studies*, 5(3-9), 112-132. [http://doi.org/10.18843/ijms/v5i3\(9\)/15](http://doi.org/10.18843/ijms/v5i3(9)/15)
- Cabello, R., Salguero, J. M., Fernández-Berrocal, P. and Gross, J. J. (2013). A Spanish adaptation of the Emotion Regulation Questionnaire. *European Journal of Psychological Assessment*, 29(4), 234-240. <http://doi.org/10.1027/1015-5759/a000150>
- Chacón-Cuberos, R. (2020). *Analysis of motivation, learning strategies, academic stress and basic psychological needs in the university context according to academic factors* (doctoral thesis). University of Jaen.
- Cohen, S., Kamarck, T. and Mermelstein, R. (1983). A global measure of perceived stress. *Journal of Health and Social Behaviour*, 24, 385-396. <http://doi.org/10.2307/2136404>
- Dominguez, J. A. (2004). Estrés en el profesorado universitario. Estudio piloto en dos centros de la Universidad de Huelva (España). *Salud de los Trabajadores*, 12(2), 5-25.
- García, M. E. (2017). *Bienestar emocional en educación: empecemos por los maestros* (tesis doctoral). Universidad de Murcia.
- Goyal, M., Singh, S., Sibinga, E. M., Gould, N. F., Rowland-Seymour, A., Sharma, R. et al. (2014). Meditation programs for psychological stress and well-being: a systematic review and meta-analysis. *JAMA Internal Medicine*, 174(3), 357-368. <http://doi.org/10.1001/jamainternmed.2013.13018>
- Gross, J. J. (ed.) (2013). *Handbook of emotion regulation*. Guilford Publications.
- Gross, J. J. and John, O. P. (2003). Individual differences in two emotion regulation processes: implications for affect, relationships, and well-being. *Journal of Personality and Social Psychology*, 85, 348-362. <http://doi.org/10.1037/0022-3514.85.2.348>
- Han, J. and Yin, H. (2016). Teacher motivation: definition, research development and implications for teachers. *Cogent Education*, 3(1), 1217819. <http://doi.org/10.1080/2331186X.2016.1217819>

- Hanaysha, J. (2016). Improving employee productivity through work engagement: evidence from higher education sector. *Management Science Letters*, 6(1), 61-70. <http://doi.org/10.5267/j.msl.2015.11.006>
- Illaja, B. and Reyes, C. (2016). Burnout y estrategias de inteligencia emocional en profesores universitarios implicados en la salud laboral educativa. *Psicología desde el Caribe*, 33(1), 31-46. <http://doi.org/10.14482/psdc.33.1.8081>
- Johnson, S. J., Machowski, S., Holdsworth, L., Kern, M. and Zapf, D. (2017). Age, emotion regulation strategies, burnout, and engagement in the service sector: advantages of older workers. *Journal of Work and Organizational Psychology*, 33, 205-216. <http://doi.org/10.1016/j.rpto.2017.09.001>
- Kamil, Y. (2014). Main factors of teachers' professional well-being. *Educational Research and Reviews*, 9(6), 153-163. <http://doi.org/10.5897/ERR2013.1691>
- Kanadli, S. (2017). Prospective teachers' professional self-efficacy beliefs in terms of their perceived autonomy support and attitudes towards the teaching profession: a mixed methods study. *Educational Sciences: Theory & Practice*, 17(5), 1847-1871. <http://doi.org/10.12738/estp.2017.5.0597>
- Lee, M., Pekrun, R., Taxer, J. L., Schutz, P. A., Vogl, E. and Xie, X. (2016). Teacher's emotions and emotion management: integrating emotion regulation theory with emotional labor research. *Social Psychology of Education*, 19, 843-863. <http://doi.org/10.1007/s11218-016-9359-5>
- Maldonado, B. R., Buenaño J. J. and Benavides, K. V. (2017). Gestión de las emociones en los docentes universitarios. *Revista San Gregorio*, 19, 6-19.
- Malesza, M. (2019). Stress and delay discounting: the mediating role of difficulties in emotion regulation. *Personality and Individual Differences*, 144, 56-60. <http://doi.org/10.1016/j.paid.2019.02.035>
- Martínez-Clares, P. and González-Lorente, C. (2019). Personal and interpersonal competencies of university students entering the workforce: validation of a scale. *RELIEVE*, 25(1), art. 6. <http://doi.org/10.7203/relieve.25.1.13164>
- Mérida-López, S. and Extremera, N. (2017). Emotional intelligence and teacher burnout: a systematic review. *International Journal of Educational Research*, 85, 121-130. <http://doi.org/10.1016/j.ijer.2017.07.006>
- Meyer, L. H. (2012). Negotiating academic values, professorial responsibilities and expectations for accountability in today's university. *Higher Education Quarterly*, 66(2), 207-217. <http://doi.org/10.1111/j.1468-2273.2012.00516.x>
- Milatz, A., Lüftenegger, M. and Schober, B. (2015). Teachers' relationship closeness with students as a resource for teacher wellbeing: a response surface analytical approach. *Frontiers in Psychology*, 6, 1949. <http://doi.org/10.3389/fpsyg.2015.01949>
- Millán, A., Calvanese, N. and D'Aubeterre, M. E. (2017). Condiciones de trabajo, estrés laboral, dependencia universitaria y bienestar psicológico en docentes universitarios. *REDU. Revista de Docencia Universitaria*, 15(1), 195-218. <http://doi.org/10.4995/redu.2017.6009>
- Mohsen, A. S. (2017). The impact of self-esteem, academic self-efficacy and perceived stress on academic performance: a cross-sectional study of Saudi psychology students. *European Journal of Educational Sciences*, 4(3), 51-63.
- Moreta-Herrera, R., Durán-Rodríguez, T. and Villegas-Villacrés, N. (2018). Regulación emocional y rendimiento como predictores de la procrastinación académica en estudiantes universitarios. *Revista de Psicología y Educación*, 13(2), 155-166. <http://doi.org/https://doi.org/10.23923/rpye2018.01.166>
- Nolen-Hoeksema, S. and Aldao, A. (2011). Gender and age differences in emotion regulation strategies and their relationship to depressive symptoms. *Personality and Individual Differences*, 51(6), 704-708. <http://doi.org/10.1016/j.paid.2011.06.012>

- Oberle, E. and Schonert-Reichl, K. A. (2016). Stress contagion in the classroom? The link between classroom teacher burnout and morning cortisol in elementary school students. *Social Science & Medicine*, 159, 30-37. 10.1016/j.socscimed.2016.04.031
- Organización Mundial de la Salud (2020). La organización del trabajo y el estrés. https://www.who.int/occupational_health/publications/stress/es/
- Pocnet, C., Dupuis, M., Congard, A. and Jopp, D. (2017). Personality and its links to quality of life: mediating effects of emotion regulation and self-efficacy beliefs. *Motivation and Emotion*, 41(2), 196-208. <http://doi.org/10.1007/s11031-017-9603-0>
- Remor, E. (2006). Psychometric properties of a European Spanish version of the Perceived Stress Scale (PSS). *The Spanish Journal of Psychology*, 9(1), 86-93. <http://doi.org/10.1017/S1138741600006004>
- Renshaw, T. L., Long, A. C. and Cook, C. R. (2015). Assessing teachers' positive psychological functioning at work: development and validation of the Teacher Subjective Wellbeing Questionnaire. *School Psychology Quarterly*, 30(2), 289-306. <http://doi.org/10.1037/spq0000112>
- Sanjuán, P., Pérez, A. M. and Bermúdez, J. (2000). Escala de autoeficacia general: datos psicométricos de la adaptación para población española. *Psicothema*, 12(2), 509-513.
- Schwarzer, R. and Hallum, S. (2008). Perceived teacher self-efficacy as a predictor of job stress and burnout: mediation analyses. *Applied Psychology*, 57, 152-171. <http://doi.org/10.1111/j.1464-0597.2008.00359.x>
- Tacca, D. R. and Tacca, A. L. (2019). Factores de riesgos psicosociales y estrés percibido en docentes universitarios. *Revista de Psicología Educativa*, 7(3), 323-353. 10.20511/pyr2019.v7n3.304
- Toropova, A., Myrberg, E. and Johansson, S. (2020). Teacher job satisfaction: the importance of school working conditions and teacher characteristics. *Educational Review*, 1-27. <http://doi.org/10.1080/00131911.2019.1705247>
- Wagh, C. E. (2020). The roles of positive emotion in the regulation of emotional responses to negative events. *Emotion*, 20(1), 54. <http://doi.org/10.1037/emo0000625>
- Wiegel, C., Sattler, S., Göritz, A. S. and Diewald, M. (2016). Work-related stress and cognitive enhancement among university teachers. *Anxiety, Stress, & Coping*, 29(1), 100-117. <http://doi.org/10.1080/10615806.2015.1025764>
- Yale, A. T. (2019). The personal tutor-student relationship: student expectations and experiences of personal tutoring in higher education. *Journal of Further and Higher Education*, 43(4), 533-544. <http://doi.org/10.1080/0309877X.2017.1377164>
- Yin, H., Han, J. and Perron, B. E. (2020). Why are Chinese university teachers (not) confident in their competence to teach? The relationships between faculty-perceived stress and self-efficacy. *International Journal of Educational Research*, 100, 101529. <http://doi.org/10.1016/j.ijer.2019.101529>
- Yin, H., Huang, S. and Lv, L. (2018). A multilevel analysis of job characteristics, emotion regulation, and teacher well-being: a job demands-resources model. *Frontiers in Psychology*, 9, 2-13. <http://doi.org/10.3389/fpsyg.2018.02395>
- Zysberg, L., Orenshtein, C., Gimmon, E. and Robinson, R. (2017). Emotional intelligence, personality, stress, and burnout among educators. *International Journal of Stress Management*, 24(S1), 122-136. <http://doi.org/10.1037/str0000028>

Resumen

La gestión emocional y la autoeficacia se asocian con bajos niveles de estrés en el profesorado universitario español: una perspectiva nacional

INTRODUCCIÓN. El estrés se define como un estado de agotamiento físico y mental, derivado de las exigencias que un contexto produce, siendo superior a lo normal. Varios informes nacionales indican que seis de cada diez docentes presentan niveles de estrés medio o alto, afectando la calidad de su actividad profesional. Esta perspectiva es muy común en la educación superior. El objetivo de esta investigación fue comprender las relaciones entre el manejo emocional, el estrés y la autoeficacia, junto con el efecto de otras variables académicas y profesionales en los docentes de educación superior. **MÉTODO.** El presente estudio fue descriptivo, ex post-facto y transversal y se realizó con una muestra de 798 profesores de educación superior de 15 universidades españolas, empleando el software IBM SPSS v.23.0 para el análisis de los datos. **RESULTADOS.** Se observó una mejor regulación emocional en los hombres, los que tienen un trabajo estable y los que trabajan en el campo de las ciencias. El estrés fue mayor entre el personal no académico, mientras que el personal docente percibió que tenía una mayor autoeficacia cuando informaba sobre responsabilidades familiares y otras obligaciones. En esta línea, se determinó que la experiencia docente favoreciera la reevaluación cognitiva y la autoeficacia, al tiempo que disminuía los niveles de estrés. Este fue especialmente el caso entre el personal docente permanente. Además, la regulación emocional favoreció una disminución del estrés y el desarrollo de la autoeficacia. **DISCUSIÓN.** Se establece la necesidad de realizar acciones para el desarrollo de técnicas de regulación emocional en el profesorado universitario. Esto permitirá gestionar situaciones estresantes e inocular la ansiedad y el estrés derivados de la actividad profesional. En definitiva, se traducirá en una mejora de la actividad docente, favoreciendo la consecución de los objetivos docentes propuestos y el rendimiento académico de los estudiantes.

Palabras clave: Educación superior, Gestión del estrés, Ajuste emocional, Autoeficacia.

Résumé

La gestion émotionnelle et l'auto-efficacité sont associées à de faibles niveaux de stress chez les professeurs d'université espagnols : une étude de perspective nationale

INTRODUCTION. Le stress est défini comme un état d'épuisement physique et mental, supérieur à la norme, dérivé des exigences qu'un contexte déterminé produit. Plusieurs rapports nationaux indiquent que six enseignants sur dix présentent des niveaux de stress moyens ou élevés affectant la qualité de leur activité professionnelle. Cette situation est très habituelle dans l'enseignement supérieur. L'objectif de cette recherche était de comprendre les relations entre la gestion émotionnelle, le stress et l'auto-efficacité, ainsi que l'impact d'autres variables académiques et professionnelles parmi les enseignants de l'enseignement supérieur. **METHODE.** La présente étude étant descriptive, ex post facto et transversale et a été réalisée auprès d'un échantillon de 798 professeurs de l'enseignement supérieur de 15 universités espagnoles. Nous avons utilisé le logiciel IBM SPSS v.23.0 pour l'analyse des données. **RESULTATS.** Une meilleure régulation émotionnelle a été observée chez les hommes, notamment parmi ceux qui ont un emploi plus stable et qui travaillent dans le domaine scientifique. Le stress est plus élevé chez le personnel

non universitaire, le personnel enseignant perçoit qu'il a une plus grande auto-efficacité quand ils ont à côté du travail des responsabilités familiales et d'autres obligations. Dans cette optique, il a été déterminé que l'expérience d'enseignement favorise la réévaluation cognitive et l'auto-efficacité tout en réduisant les niveaux de stress. C'était particulièrement le cas parmi le personnel enseignant permanent. De plus, la régulation émotionnelle favorise la diminution du stress et le développement de l'auto-efficacité. **DISCUSSION.** Le besoin de mener des actions pour le développement des techniques de régulation émotionnelle chez les enseignants universitaires est établi. Cela permettra aux enseignants de gérer les situations stressantes ainsi que d'inoculer l'anxiété et le stress liés à leur activité professionnelle. À terme, elle se traduira par une amélioration de l'activité d'enseignement qui favorisera l'atteinte des objectifs pédagogiques proposés et le la performance académique des étudiants.

Mots-clés : Enseignement supérieur, La gestion du stress, Ajustement émotionnel, Auto-efficacité.

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